



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/006,055	12/06/2001	Ellis T. Fisher	010387	9043

23696 7590 09/22/2004

Qualcomm Incorporated  
Patents Department  
5775 Morehouse Drive  
San Diego, CA 92121-1714

EXAMINER

D AGOSTA, STEPHEN M

ART UNIT

PAPER NUMBER

2683

DATE MAILED: 09/22/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

**Application No.**

10/006,055

**Applicant(s)**

FISHER, ELLIS T.

**Examiner**

Stephen M. D'Agosta

**Art Unit**

2683

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-29 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 22-25 is/are allowed.
- 6) ☒ Claim(s) 1-13, 15-17, 19-21 and 26-27 is/are rejected.
- 7) ☒ Claim(s) 14, 18, 28 and 29 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |   |   |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. ____. |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)  | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date <u>2, 4</u> . | 6) <input type="checkbox"/> Other: ____.  |

## DETAILED ACTION

### *Information Disclosure Statement*

The information disclosure statements (IDS) submitted on 12-6-01 and 8-28-03 are in compliance and accordingly, the information disclosure statements are being considered by the examiner.

### *Drawings*

The drawings were received on 12-6-04 and have been reviewed by the draftsman and examiner.

### *Claim Rejections - 35 USC § 102*

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

**Claims 1-3, 5-9, 11-12, 16, 20-21 and 26** rejected under 35 U.S.C. 102(b) as being anticipated by Magnusson et al. WO99-49690 (hereafter Magnusson).

As per **claim 1**, Magnusson teaches a system comprising:

A processor configured to detect when a wireless mobile unit is in an high data rate (HDR) area (page 5, L16 to page 6, L12 teaches SIM Card processor receiving/storing data from cell broadcast to include information about an HDR area), said processor being configured to determine a need for exchanging data between said wireless mobile unit and a base station (BTS) [page 6, L13-29 teaches system using carrier data for selection of an optimal system for data exchange and example disclosed on page 6, L30 to page 7, L21]; and

A data burst optimizer (DBO) configured to exchange said data between said wireless mobile unit and said BTS in said HDR area (page 7, L15-21 teaches an example whereby the processor/DBO selects optimal means for exchanging data based on the user's selected application).

Art Unit: 2683

As per **claim 2**, Magnusson teaches claim 1 wherein said processor invokes said DBO to exchange said data between said wireless mobile unit and said BTS when said wireless mobile unit is in said HDR area (page 5, L30-35 teaches system selecting the optimal carrier service, eg. HDR, based on the application chosen).

As per **claim 3**, Magnusson teaches claim 2 wherein said DBO is configured to continuously detect when said wireless mobile unit is in said HDR area (page 5, L16-35 teaches mobile receiving SMS over cell broadcast which one skilled understands can be continuously monitored for local carrier service changes as the mobile roams. The examiner also notes that the mobile unit must continuously monitor for HDR coverage as it roams since roaming out of coverage will terminate the HDR service).

As per **claim 5**, Magnusson teaches claim 3 wherein said DBO is configured to stop exchanging said data between said mobile unit and said BTS when said mobile is not in said HDR area (page 5, L16-35 teaches mobile receiving SMS over cell broadcast which one skilled understands can be continuously monitored for local carrier service changes as the mobile roams. The examiner also notes that the mobile unit must continuously monitor for HDR coverage as it roams since roaming out of coverage will terminate the HDR service).

As per **claim 6**, Magnusson teaches a wireless system comprising:

Means for detecting when a mobile is in an HDR area (page 5, L16 to page 6, L12 teaches SIM Card processor receiving/storing data from cell broadcast to include information about an HDR area);

Means for determining a need to exchange data between said mobile and a BTS [page 6, L13-29 teaches system using carrier data for selection of an optimal system for data exchange and example disclosed on page 6, L30 to page 7, L21]; and

Means for exchanging said data between said mobile unit and said BTS (page 7, L15-21 teaches an example whereby the processor/DBO selects optimal means for exchanging data based on the user's selected application).

As per **claim 7**, Magnusson teaches claim 6 wherein said detecting means invokes said exchanging means to exchange said data between when said wireless mobile unit is in said HDR area (page 5, L30-35 teaches system selecting the optimal carrier service, eg. HDR, based on the application chosen).

As per **claim 8**, Magnusson teaches claim 6 wherein said detecting means invokes said exchanging means to exchange said data between when said wireless mobile unit is in said HDR area (page 5, L30-35 teaches system selecting the optimal carrier service, eg. HDR, based on the application chosen) and said determining means determines said need to exchange said data between said wireless mobile unit and BTS (page 6, L30 to page 7, L20 teaches an example whereby the user operates a computer and the system determines which carrier service to use for transmitting/exchanging data.

Art Unit: 2683

As per **claim 9**, Magnusson teaches claim 7 wherein said exchanging means continuously detects when said wireless mobile unit is in said HDR area (page 5, L16-35 teaches mobile receiving SMS over cell broadcast which one skilled understands can be continuously monitored for local carrier service changes as the mobile roams. The examiner also notes that the mobile unit must continuously monitor for HDR coverage as it roams since roaming out of coverage will terminate the HDR service).

As per **claim 11**, Magnusson teaches claim 9 wherein said exchanging means stops an exchange of said data between said mobile unit and said BTS when said mobile is not in said HDR area (page 5, L16-35 teaches mobile receiving SMS over cell broadcast which one skilled understands can be continuously monitored for local carrier service changes as the mobile roams. The examiner also notes that the mobile unit must continuously monitor for HDR coverage as it roams since roaming out of coverage will terminate the HDR service).

As per **claim 12**, Magnusson teaches a method for exchanging data between a wireless mobile unit and a BTS comprising:

Detecting when said wireless mobile is in a HDR area (page 5, L8-35 teaches system selecting the optimal carrier service, eg. HDR, based on an SMS cell broadcast message);

Determining a need for exchanging said data between said mobile and BTS (user operates computer application to transmit/receive data via mobile/SIM, page 5, L30-35);

Invoking a data burst optimizer to synchronize an exchange of said data between said mobile and said BTS (page 6, L13-29 teaches system using carrier data for selection of an optimal system for data exchange and example disclosed on page 6, L30 to page 7, L21)

Exchanging said data between said wireless mobile unit and said BTS when said mobile is in said HDR area (page 7, L15-21 teaches an example whereby the processor/DBO selects optimal means, eg. HDR, for exchanging data based on the user's selected application).

As per **claim 16**, Magnusson teaches claim 15 wherein said pinging step is performed by said data burst optimizer (page 7, L15-21 teaches an example whereby the processor/DBO selects optimal means, eg. HDR, for exchanging data based on the user's selected application and hence one skilled would expect said processor/DBO to perform pinging step as well).

As per **claim 20-21**, Magnusson teaches claim 19/17 wherein said pinging step is performed by said data burst optimizer (page 7, L15-21 teaches an example whereby the processor/DBO selects optimal means, eg. HDR, for exchanging data based on the user's selected application and hence one skilled would expect said processor/DBO to perform pinging step as well).

Art Unit: 2683

As per **claim 26**, Magnusson teaches a computer readable medium including computer program, said program implementing a method for exchanging data between mobile and BTS (figure 1 shows laptop connected to mobile/SIM which inherently use computer/instructions to provide communications) comprising:

A first code segment for detecting when said wireless mobile is in a HDR area (page 5, L8-35 teaches system selecting the optimal carrier service, eg. HDR, based on an SMS cell broadcast message);

A second code segment for determining a need to exchange data between said mobile and said BTS (user operates computer application to transmit/receive data via mobile/SIM, page 5, L30-35);

A third code segment for invoking a DBO to synchronize an exchange of said data between said mobile and said BTS (page 6, L13-29 teaches system using carrier data for selection of an optimal system for data exchange and example disclosed on page 6, L30 to page 7, L21);

A fourth code segment for exchanging said data between said mobile and said BTS when said mobile is in said HDR area (page 7, L15-21 teaches an example whereby the processor/DBO selects optimal means, eg. HDR, for exchanging data based on the user's selected application).

### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

**Claims 4, 10, 13, 15, 17, 19 and 27** rejected under 35 U.S.C. 103(a) as being unpatentable over Magnusson.

As per **claim 4**, Magnusson teaches claim 2 **but is silent on** wherein said DBO transmits a logon name and password to said BTS to authenticate said wireless mobile unit.

Magnusson teaches use of a computer/laptop PC (figure 1, #3) and typically user logon name and password for security authentication (eg. via Microsoft Windows OS). One skilled would use the well known method of requiring Logon/password for security purposes. Cellular systems also utilize security precautions to prevent fraud and cloning whereby the user is authenticated during the registration process.

It would have been obvious to one of ordinary skill in the art at the time of applicant's invention to modify Magnusson, such that said DBO transmits a logon name

Art Unit: 2683

and password to said BTS to authenticate said wireless mobile unit, to provide authentication of the user via a logon name and password.

As per **claim 10**, Magnusson teaches claim 7 **but is silent on** wherein said exchanging means transmits a logon name and password to said BTS to authenticate said wireless mobile unit.

Magnusson teaches use of a computer/laptop PC (figure 1, #3) and typically user logon name and password for security authentication (eg. via Microsoft Windows OS). One skilled would use the well known method of requiring Logon/password for security purposes. Cellular systems also utilize security precautions to prevent fraud and cloning whereby the user is authenticated during the registration process.

It would have been obvious to one of ordinary skill in the art at the time of applicant's invention to modify Magnusson, such that said DBO transmits a logon name and password to said BTS to authenticate said wireless mobile unit, to provide authentication of the user via a logon name and password.

As per **claim 13**, Magnusson teaches claim 12 **but is silent on** wherein said exchanging means transmits a logon name and password to said BTS to authenticate said wireless mobile unit.

Magnusson teaches use of a computer/laptop PC (figure 1, #3) and typically user logon name and password for security authentication (eg. via Microsoft Windows OS). One skilled would use the well known method of requiring Logon/password for security purposes. Cellular systems also utilize security precautions to prevent fraud and cloning whereby the user is authenticated during the registration process.

It would have been obvious to one of ordinary skill in the art at the time of applicant's invention to modify Magnusson, such that said DBO transmits a logon name and password to said BTS to authenticate said wireless mobile unit, to provide authentication of the user via a logon name and password.

As per **claim 15**, Magnusson teaches claim 12 **but is silent on** comprising:  
Pinging said BTS to detect when said wireless mobile unit is in said HDR area after said invoking step and prior to exchanging step.

Magnusson teaches the BTS sending an SMS cell broadcast message which the mobile will receive to determine available carrier services (page 5, L16-35) – once received, the mobile would then exchange data via an optimal service. The "PING" command is a well known industry standard supported by TCP/IP and one skilled would use to determine availability of BTS services if/when a SMS cell broadcast message is not received.

It would have been obvious to one of ordinary skill in the art at the time of applicant's invention to modify Magnusson, such that it pings said BTS to detect when said wireless mobile unit is in said HDR area after said invoking step and prior to exchanging step, to provide means for detecting if the mobile can use HDR services for data transmission.

Art Unit: 2683

As per **claim 17**, Magnusson teaches a method for exchanging data between a wireless mobile unit and a BTS, said method comprising:

Detecting when said wireless mobile is in a HDR area (page 5, L8-35 teaches system selecting the optimal carrier service, eg. HDR, based on an SMS cell broadcast message);

Determining a need to exchange data between said mobile and said BTS (user operates computer application to transmit/receive data via mobile/SIM, page 5, L30-35);

Invoking a DBO to synchronize an exchange of said data between said mobile and said BTS (page 6, L13-29 teaches system using carrier data for selection of an optimal system for data exchange and example disclosed on page 6, L30 to page 7, L21);

Exchanging said data between said mobile and said BTS when said mobile is in said HDR area (page 7, L15-21 teaches an example whereby the processor/DBO selects optimal means, eg. HDR, for exchanging data based on the user's selected application);

**But is silent on** Transmitting a logon name and password from said mobile to said BTS to authenticate said mobile unit.

Magnusson teaches use of a computer/laptop PC (figure 1, #3) and typically user logon name and password for security authentication (eg. via Microsoft Windows OS). One skilled would use the well known method of requiring Logon/password for security purposes. Cellular systems also utilize security precautions to prevent fraud and cloning whereby the user is authenticated during the registration process.

It would have been obvious to one of ordinary skill in the art at the time of applicant's invention to modify Magnusson, such that said DBO transmits a logon name and password to said BTS to authenticate said wireless mobile unit, to provide authentication of the user via a logon name and password.

As per **claim 19**, Magnusson teaches claim 17 **but is silent on** comprising:

Pinging said BTS to detect when said wireless mobile unit is in said HDR area after said invoking step and prior to exchanging step.

Magnusson teaches the BTS sending an SMS cell broadcast message which the mobile will receive to determine available carrier services (page 5, L16-35) – once received, the mobile would then exchange data via an optimal service. The "PING" command is a well known industry standard supported by TCP/IP and one skilled would use to determine availability of BTS services if/when a SMS cell broadcast message is not received.

It would have been obvious to one of ordinary skill in the art at the time of applicant's invention to modify Magnusson, such that it pings said BTS to detect when said wireless mobile unit is in said HDR area after said invoking step and prior to exchanging step, to provide means for detecting if the mobile can use HDR services for data transmission.



Art Unit: 2683

As per **claim 27**, Magnusson teaches claim 26 **but is silent on** wherein a fifth code segment for transmitting a logon name and password to said BTS to authenticate said wireless mobile unit.

Magnusson teaches use of a computer/laptop PC (figure 1, #3) and typically user logon name and password for security authentication (eg. via Microsoft Windows OS). One skilled would use the well known method of requiring Logon/password for security purposes. Cellular systems also utilize security precautions to prevent fraud and cloning whereby the user is authenticated during the registration process.

It would have been obvious to one of ordinary skill in the art at the time of applicant's invention to modify Magnusson, such that said DBO transmits a logon name and password to said BTS to authenticate said wireless mobile unit, to provide authentication of the user via a logon name and password.

### ***Allowable Subject Matter***

1. Claims 14, 18 and 28-29 objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. The use of an application being authenticated via the BTS is novel in the examiner's opinion when used in conjunction with it's independent claim.

2. Claims 22-25 allowed – independent claim 22 recites use of the mobile in a HDR area, determining need to exchange data, use of a DBO, transmitting logon and password and authenticating an application in an application database with the BTS, and exchanging data between mobile and BTS.

### ***Conclusion***

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure:

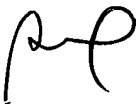
1. Cudak et al. US 6,253,063
2. O'Carrol US 6,714,794
3. McAlinden US 5,946,633
4. Walding US 6,031,845

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Stephen M. D'Agosta whose telephone number is 703-306-5426. The examiner can normally be reached on M-F, 8am to 5pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Bill Trost can be reached on 703-308-5318. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Stephen D'Agosta



WILLIAM TROST  
SUPERVISORY PATENT EXAMINER  
TECHNOLOGY CENTER 2600